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SERIAL NUMBER	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.
07/821,750	01/02/92	HAUPTMANN	R 0652-0820001 EXAMINER CARLSON, K

18M1
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ART UNIT	PAPER NUMBER
1812	8

DATE MAILED:
05/25/93

This is a communication from the examiner in charge of your application.
COMMISSIONER OF PATENTS AND TRADEMARKS

This application has been examined Responsive to communication filed on Page 73-193 This action is made final.

A shortened statutory period for response to this action is set to expire 3 month(s). — days from the date of this letter.
Failure to respond within the period for response will cause the application to become abandoned. 35 U.S.C. 133

Part I THE FOLLOWING ATTACHMENT(S) ARE PART OF THIS ACTION:

- Notice of References Cited by Examiner, PTO-892.
- Notice re Patent Drawing, PTO-948.
- Notice of Art Cited by Applicant, PTO-1449.
- Notice of Informal Patent Application, Form PTO-152.
- Information on How to Effect Drawing Changes, PTO-1474.
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Part II SUMMARY OF ACTION

- Claims 2-7, 9-14, 17-18, 22-23 are pending in the application.
Of the above, claims _____ are withdrawn from consideration.
- Claims 1, B1, 15, 16, 19-21, 24-26 have been cancelled.
- Claims _____ are allowed.
- Claims 2-7, 9-14, 17, 18, 22-23 are rejected.
- Claims _____ are objected to.
- Claims _____ are subject to restriction or election requirement.
- This application has been filed with informal drawings under 37 C.F.R. 1.85 which are acceptable for examination purposes.
- Formal drawings are required in response to this Office action.
- The corrected or substitute drawings have been received on _____ Under 37 C.F.R. 1.84 these drawings are acceptable. not acceptable (see explanation or Notice re Patent Drawing, PTO-948).
- The proposed additional or substitute sheet(s) of drawings, filed on _____ has (have) been approved by the examiner. disapproved by the examiner (see explanation).
- The proposed drawing correction, filed on _____, has been approved. disapproved (see explanation).
- Acknowledgment is made of the claim for priority under U.S.C. 119. The certified copy has been received not been received been filed in parent application, serial no. _____; filed on _____
- Since this application appears to be in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11; 453 O.G. 213.
- Other

EXAMINER'S ACTION

This Office Action is in response to Paper #7, filed March 1, 1993. Claims 1, 8, 15, 16, 19-21, and 24-26 have been cancelled. Claims 2-7, 9-14, 17, 18, 22, and 23 are pending and are under examination.

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The rejections of Claims 2-7, 9-14, 17, 18, 22, and 23 under 35 USC 112, first and second paragraph, are withdrawn.

10 Applicant's arguments have been fully considered but they are not deemed to be persuasive.

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

15 Claims 2-7, 9-14, 17, 18, 22, and 23 are rejected under 35 U.S.C. § 103 as being unpatentable over Wallach et al. as discussed in the previous Office Action. Applicants have narrowed their claimed invention to the DNA encoding the soluble form of the TNF receptor, TNF-bp. Applicants argue that if one follows the teachings of Wallach et al. as discussed in the previous Office Action, then one would obtain the membrane-bound TNF receptor. The Examiner agrees. However, the membrane bound TNF receptor has been known since the mid-1980s and the soluble

TNF-bp is not necessarily related to the TNF receptor. Wallach et al. teach how to purify the soluble TNF-bp and how to sequence it (pages 7-8). Once the protein sequence is determined, then the DNA sequence encoding the protein can be examined (page 9, 5 line 35+). Therein, the cDNA encoding the soluble TNF-bp is obvious in view of Wallach et al. Further, Wallach teaches how to recombinantly produce the protein (page 10+) and one does not necessarily need to reverse transcribe mRNA and so forth as set forth in Wallach et al. and on page 5 of the previous Office 10 Action when the TNF-receptor was involved in the Claims. Therefore, the DNA encoding TNF-bp, expression systems, and recombinant production of TNF-bp remain obvious over Wallach et al.

15 Claims 2-7, 9-14, 17, 18, 22, and 23 are rejected under 35 U.S.C. § 103 as being unpatentable over Olsson et al. in view of Wallach et al. or any molecular biology laboratory techniques book or manual. This rejection is essentially like that of the previous Office Action. Because the TNF-receptor has been 20 cancelled from the initially claimed invention, Clark et al. no longer makes obvious these Claims. Olsson et al. teach how to purify and sequence the soluble TNF-bp. Olsson et al. do not teach the DNA encoding the TNF-bp as stated in the previous

Office Action and pointed out by the Applicants. However, Olsson et al. makes a point of identifying the binding protein and the receptor, that is, one may be separate or a part of the other. Therein, after sequencing the soluble protein, it would have been 5 obvious to one of ordinary skill in the art to use the teachings of Wallach et al. to recombinantly produce the protein as discussed above. Alternatively, any laboratory techniques manual teaches how to insert cDNA into plasmids and express the encoded protein from transformed cells. Therefore, these Claims are 10 obvious in view of the prior art.

The Examiner believes that all pertinent issues have been addressed.

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Applicant's amendment necessitated the new grounds of rejection. Accordingly, **THIS ACTION IS MADE FINAL.** See M.P.E.P. § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 C.F.R. § 1.136(a).

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A SHORTENED STATUTORY PERIOD FOR RESPONSE TO THIS FINAL ACTION IS SET TO EXPIRE THREE MONTHS FROM THE DATE OF THIS ACTION. IN THE EVENT A FIRST RESPONSE IS FILED WITHIN TWO MONTHS OF THE MAILING DATE OF THIS FINAL ACTION AND THE ADVISORY ACTION 25 IS NOT MAILED UNTIL AFTER THE END OF THE THREE-MONTH SHORTENED STATUTORY PERIOD, THEN THE SHORTENED STATUTORY PERIOD WILL EXPIRE

ON THE DATE THE ADVISORY ACTION IS MAILED, AND ANY EXTENSION FEE PURSUANT TO 37 C.F.R. § 1.136(a) WILL BE CALCULATED FROM THE MAILING DATE OF THE ADVISORY ACTION. IN NO EVENT WILL THE STATUTORY PERIOD FOR RESPONSE EXPIRE LATER THAN SIX MONTHS FROM THE DATE OF THIS FINAL ACTION.

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Karen Cochrane Carlson, Ph.D. whose telephone number is (703) 308-0034.

10 Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 308-0196.

Robert J. Hill Jr.
ROBERT J. HILL, JR.
SUPERVISORY PATENT EXAMINER
GROUP 1800